DOCUMENT RESUME

ED 361 784 CS 508 296

AUTHOR Chatham-Carpenter, April D.
TITLE Home vs. Public Schoolers' Relationships: Differences in Social Networks.
PUB DATE Oct 92
NOTE 41p.; Paper presented at the Annual Meeting of the Speech Communication Association (78th, Chicago, IL, October 29-November 1, 1992).
PUB TYPE Speeches/Conference Papers (150) -- Reports - Research/Technical (143) -- Tests/Evaluation Instruments (160)

EDRS PRICE MF01/PC02 Plus Postage.
DESCRIPTORS Adolescents; Communication Research; Elementary School Students; Elementary Secondary Education; *Home Schooling; *Interpersonal Communication; Parent Student Relationship; *Peer Relationship; Public Schools; Questionnaires; Secondary School Students; *Social Development; *Socialization
IDENTIFIERS Oklahoma; Social Needs

ABSTRACT

Noting the lack of basic information necessary to begin to make conclusions about a home schooled child's social contacts, a study investigated the social networks of home vs. public schooled children (with a child's "social network" defined as all of the people who interact on a regular basis with the child at least once a month). The subject pool consisted of 21 home schooled children and 20 public schooled children, ages 12-18, living in Oklahoma. Each subject kept a list of his/her interactions over a month's period of time, i.e. who he/she talked with for periods of at least 2 minutes or more. Follow-up surveys elicited information from subjects and their mothers about the structural and interactional quality of subjects' relationships with people on the list. Results indicated that the home schooling process does affect the nature of the relationships experienced in adolescence for home schoolers. The study found overall that home schoolers are not "at risk" in terms of the total number of people with whom they interact but are "at risk" in the sense of feeling less closeness towards and receiving less support from their peer friend relationships than public schoolers. (Five tables of data are included; 60 references and an appendix providing the Home/Public Relationships Questionnaire are attached.) (NH)

****
* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *
****

ED 361 784

Home vs. Public Schoolers' Relationships:

Differences in Social Networks

April D. Chatham-Carpenter

University of Northern Iowa
Department of Communication Studies
Cedar Falls, Iowa 50614-0357
(319) 273-2217

Running Head: HOME/PUBLIC RELATIONSHIPS

CS508296

Paper presented at the annual convention of the Speech Communication Association, Chicago, IL, October, 1992.

U.S. DEPARTMENT OF EDUCATION
Office of Educational Research and Improvement
EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)

X This document has been reproduced as received from the person or organization originating it

☐ Minor changes have been made to improve reproduction quality

• Points of view or opinions stated in this document do not necessarily represent official OERI position or policy

"PERMISSION TO REPRODUCE THIS MATERIAL HAS BEEN GRANTED BY

April Chatham-Carpenter

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)."

Abstract

This study investigated the social networks of 21 home and 20 public schooled adolescents and found that home schoolers are not "at risk" overall, as compared to a similar group of public schoolers, in terms of the total numbers of people with whom they interact, but are "at risk" in the sense of feeling less closeness towards and receiving less support from their peer friend relationships than public schoolers.

Home vs. Public Schoolers' Relationships: Differences in Social Networks

A major concern for educators and the general public related to home schooling is the role of "socialization." It has been assumed that home schooled children experience less same-age peer interaction than traditionally schooled children. If home schooled children do experience less same-age peer interaction, what effects will this lack of experience have on the present and future lives of home schooled children? One could argue that a home schooled child might be irreparably crippled socially--functioning as an introvert in society, unable to cope with tough happenings in the real world; i.e., home schooled children might become "misfits, social recluses, or out of step with the real world" (Reed, 1984, p. 7). Another social effect at issue is the possibility that children might become overly dependent on their parents.

There is both theoretical and research-based interest in such concerns (cf. Asher & Williams, 1987; Garvey, 1986; Gottman, Gonso, & Schuler, 1976). It seems that both child developmentalists (cf. Piaget, 1926, 1932; Sullivan, 1953) and home schoolers (cf. Welch, 1984) value the goal of developing a child's social skills, but they espouse different strategies for reaching that goal. Home schoolers value the family as the "developer" of a child's social competencies, and acknowledge that the family's role is to develop a secure foundation from which a child can explore his/her world with the support of his/her parents; i.e., they espouse a single-process model of development (cf. Hartup, 1979) and view peer socialization as negative, in the sense that it may "cause" children to be peer dependent. Reflecting the negative rhetoric of the home schooling movement toward "peer dependency," Moore (1987) summarizes:

> Children who are less with their parents than with peers, become peer dependent [underline mine]. This in turn brings loss of self worth, optimism, respect for parents and even trust in peers. They become age-segregated, comfortable only with their agemates, developing essentially a negative, me-first kind of sociability. (pp. 3-4)

In short, from a home schooler's perspective, parental socialization produces better children than peer socialization.

In contrast, Piaget and others (cf. Hatch, 1987; Maccoby & Martin, 1983; Romaine, 1984; Rubin, 1982) espouse the values of peer socialization in developing a child's social competencies, viewing opportunities for numerous peer interactions as necessary and important for a child's development. In doing so, they do not deny the role of the parents in socialization (e.g., in providing rich experiences for the child), but they see peer socialization as important in its own right; therefore, they support a dual- or multi-process model of development. For example, Romaine (1984) notes that having a child's main language input in early life come from adult family members is adequate for intra-group communication; however, a child will learn new ways of interacting (e.g., games; teasing; arguing) when interacting with other children. This view rests upon the premise that there is a difference between "unilateral authority" and "mutual reciprocity" (cf. Hunter & Youniss, 1982). Parent-child relationships illustrate "unilateral authority," in which one party (i.e., the parent) has knowledge which s/he attempts to impose on another party (i.e., the child). On the other hand, in "mutual reciprocity," "both members [i.e., children] share equal privileges in expressing opinions, being listened to, and mutually constructing new understanding" (Hunter & Youniss, 1982, p. 807). In short, friendship is seen as a framework in which concepts

of cooperation, mutual respect, and interpersonal sensitivity are developed (cf. Smollar & Youniss, 1982), since the principle of "mutual reciprocity" is in effect in friendship relations. For example, Hunter (1984) studied 180 adolescents (ages 12-13, 14-15, and 18-20), finding that the most common form of socializing interaction for parents was "unilateral" social verification based on greater experience; for example, "my father tells me that I would realize his ideas are right when I get more experience" (p. 1094). For friends, the most common form of socializing interaction Hunter (1984) found was "mutual" social verification, e.g., "my friend tries to figure out with me whether or not I'm right" (p. 1094).

Several researchers have investigated the functions of different significant relationships for adolescents, especially the parental and peer (or peer friend) relationships (e.g., Hunter, 1985; Montemayor, 1982; Sebald, 1986; Walker & Greene, 1986). These studies have focused on differences related to (a) quality of relationships (e.g., Adler & Furman, 1988; Armsden & Greenberg, 1987; Bo, 1990; Furman & Burhmester, 1985; Greenberg, Siegel, & Leitch, 1983; Hertz-Lazarowitz, Rosenberg, & Guttmann, 1989; Kon & Losenkov, 1978); (b) decision-making about discussing certain topics (cf. Rawlins & Holl, 1988), and (c) activity types employed (e.g., Csikszentmihalyi, Larson, & Prescott, 1977; Larson, 1983; Larson, Kubey, & Colletti, 1989; Montemayor, 1982). In short, this literature seems to indicate that (a) different types of relationships are needed for a child's well-being, especially as s/he grows into adolescence, and (b) different contexts for interaction, particularly the parent and peer friend contexts, provide a variety of interaction opportunities and different quality of interactions in which an adolescent can participate.

However, although there have been studies of peer interaction for traditionally schooled children (e.g., Blyth, Hill, & Thiel, 1982; Crockett, Losoff, & Petersen, 1984; Montemayor & Van Komen, 1980), no studies have investigated the extent to which these opportunities for interaction differ between home and public schooled children. Only a few studies have reported information on the home schooling child's interaction outside the home. For example, Schemmer's (1985) dissertation, which studied five home schooled children, concluded that "all the children in the study were engaged in other groups outside the home which offered opportunities for social contacts with other children" (p. 198). Respondents in Wartes' (1987) study of 219 Washington State home schoolers indicated a median of 20-29 hours/month for (1) contact with age peers, (2) contact with non-age peers outside the immediate family, and (3) participation in organized community activities. Montgomery (1988), based on her interviews of 50 Washington state home schooling families with home schoolers ages 10+, concludes that home schooled adolescents "are not isolated from social interaction with their peer group nor denied participation in a variety of at-home and out-of-the-home organized and group activities" (p. 23). Bliss (1989) asked 70 home schooling families in Southwestern Michigan the question "do/does your child(ren) participate in any group activities with others their age." She found that 93% (n = 65) said "yes," and only 7% (n = 5) said "no." Activities listed by families included activities such as Sunday School, support groups, scouts, 4-H, neighbors, sports, music, community theatre, and visiting friends. However, Greene (1984), in surveying 88 home schooling families from Alaska, found that only 51% of the families answered "yes" to the question "do you participate in community activities such as clubs, sports, or large groups with others in your age group." The remaining

41 participants were asked "do you have friends nearby with whom you spend time," and only 63% of these participants said "yes." The above studies illustrate that some, but not all, home schooling families do participate in interactions and activities outside of the home.

Studies have also found that (a) home schoolers (grades 4 - 12, n = 224) scored higher than national averages on the Piers-Harris Self-Concept Scale (Taylor, 1987), (b) home schooling families (n = 25) scored highly on the cohesion and adaptability scales of Olson, Sprenkle, and Russell's (1979) Circumplex Model measuring aspects of family systems (Allie-Carson, 1990), and (c) home schoolers' (n = 28) primary focus was in the family arena while children from the private school (n = 32) manifested a greater focus on peer interaction (Maarse-Delahooke, 1986).

But, before definitive claims can be made, more evidence is needed. Research is needed that explores the interactions of home schooled children. For example, do they experience less same-age peer interaction than traditionally schooled children? Perhaps the assumption is not true that home schoolers have less same-age interactions with peers than traditional schoolers.

In summary, the basic information that is required to begin to make conclusions about a home schooled child's social contacts is not available. This preliminary step is necessary in order to provide a theoretical basis from which to investigate the functional communication competence of home schooled children (as compared to public schooled children) in different relationships.

Methods

This study investigated the social networks of home vs. public schooled children, since a child's social networks can be used to describe the

relationships that a child (or adult) is experiencing (cf. Bo, 1990; Cauce, 1986; Cochran & Bo, 1989; Cochran & Brassard, 1979; Salzinger, Hammer, & Antrobus, 1988; Stohl, 1989; Tietjen, 1982, 1989). For this study, a child's "social network" consisted of all of the people who interact on a regular basis with the child--at least once a month.

The three research questions investigated in this study were: (a) what are the structural differences (i.e., size, age) between home and public schooled adolescents' social networks, (b) what are the differences in frequency of interaction with contacts between home and public schooled adolescents, and (c) what are the differences (i.e., size, closeness, supportiveness) between the relationship types of parent and peer friend for home vs. public schooled adolescents?

Subjects

The subject pool consisted of 21 home schooled children and 20 public schooled children, ages 12-18, from Oklahoma. Twenty-seven home schooling families (of 43 families contacted) agreed to participate in the study; a total of 19 families completed the study. (Two of these 19 families decided to have both a son and a daughter participate in the study; therefore, there was a total of 21 home schooling subjects.) Two of the families in the home sample employed both home and public/private schooling for their school-aged children; however, the subjects in the study were home schooled. The mean age at which home schooling began for the subjects in the study was 10.48, with a modal age of 10. The home subjects were home schooled for a mean of 4.10 years, and the modal number of years home schooled was 5 years.

Public schooling subjects, with demographic characteristics similar to the home schooling subjects, were obtained through names solicited from the home

schooling families, as well as through a high school public schooling teacher in the central Oklahoma area. A deliberate attempt was made to obtain names of two-parent public schooling families who regularly attended church, since all of the home schooling families in the study had two parents present in the home and were actively involved in church or in another religious body. Approximately 55 public schooling families were contacted, 28 families agreed to participate in the study, and 20 families completed the study. Four of the public schooled families employed home, private, and/or public schooling for their school-aged children, but the subjects participating in the study were public schooled.

The mean age for the children in the home sample was 14.48, and the mean age for the public sample was 14.85. There were 9 male subjects in the home sample, and there were 8 males in the public sample. There were 12 female subjects in the home sample and 12 in the public sample.

All of the families participating in the study were Caucasian in race, except for one Afro-American home schooling family. Two subjects (one Home and one Public) were living with a step-dad and their mother.

Procedures

To gather information about the subjects' social contacts, each subject was initially asked to keep a record of his/her interactions over a month's period of time, i.e., who s/he talked to and what s/he talked about to each person recorded. It was suggested that each subject include anyone whom s/he had interacted with for at least 2 minutes or more during this time period. After the month was completed, each subject was asked to have his/her parents and siblings review his/her list and add any additional person with whom the

subject usually interacted at least once a month. Phone calls to the subjects served as a reminder for the project.

After the network list was constructed, follow-up survey forms (see sample form questions in Appendix) were given to both the subject and his/her mother to gain information about the subject's social contacts on the network list. These forms were used to gather information regarding the structural and interactional quality of a subject's relationships (e.g., age of contacts; frequency of interaction within the relationships; closeness and supportiveness present in the relationships). Only the information collected from the child was used in this study. All network questionnaires were pilot tested with children the same age of the subjects before the surveys were used in the study.

The score or value for the perceived level of intimacy or closeness (from Blyth & Traeger, 1988) with a given person is the mean of the four items (cf. Appendix, items L through O) divided by four. Blyth & Traeger (1988) report that the intimacy scale originally consisted of six items, but two of the items--"is this person a close friend?" and "how much do you want to be like this person?"--were dropped from the scale to increase internal consistency and reliability. Blyth (1984, as cited by Blyth & Traeger, 1988) found that across all types of relationships, the reliability coefficient alpha for the four-item scale was .82. The scale has been found to discriminate equally well for both males and females and for a wide variety of types of relationships, with all reliability coefficient alphas over .77. Blyth and Traeger (1988) report that the scale has validly discriminated between relationships which are assumed to be at different intimacy levels (e.g., mother vs. extended family member).

Perceived supportiveness of relationships was measured via a shortened version of the Cornell Parent Behavior Description (cf. Appendix, items P through Y; Devereux, Bronfenbrenner, & Rodgers, 1969; Vondra & Garbarino, 1988). The original instrument was developed via a factor analysis of 45 details of parental behavior (cf. Devereux, Bronfenbrenner, & Suci, 1962). These details were grouped into four major categories or subscales: (1) supporting, (2) demanding, (3) controlling, and (4) punishing. For this study, I used the supporting subscale which consists of six dimensions, i.e., nurturance (items P, Q, & R), principled discipline (item S), instrumental companionship (items T & U), consistency of expectation (item V), encouragement of autonomy (items W & X), and indulgence (item Y). Based on investigations of 11-12 year old children from England, the Federal Republic of Germany, and the United States, Devereux et al. (1969) found that the supporting subscale was able to reliably identify patterns of similarity and difference in parental behavior across the three cultures.

Results

Research Question One: Size and Ages of Network

The first research question investigated whether there were significant differences between home and public schooled subjects on the size and ages of their social networks.

Total contacts made by subjects in the study varied according to the two groups. The 21 Home subjects made a total of 1035 contacts, with a mean of 49.29 contacts per subject; the range in contacts was from 7 to 150. The Public sample of 20 subjects made 1125 contacts, with a mean of 56.25 contacts/subject; the range in contacts was from 18 to 154. A t-test with the

unequal variances solution showed the difference in number of contacts for Home and Public subjects to not be a significant one, t (38.8) = -0.6319, $p < .5312$.

The proportion of younger, same-age, and older network contacts to the subject's age lends support for the idea that public schooled subjects have more contacts with their peers than home schooled subjects do, and that home schooled subjects have more contacts with both older and younger people than public schooled subjects do. The categories in Table 1 were defined as follows: (1) Younger = 2+ years younger than the subject, (2) Peer = within 2 years of the subject's age, (3) Older = 2+ years older than the subject's age.

Insert Table 1 about here

The repeated measures ANOVA indicated a significant difference between the different levels of age overall, F (2, 78) = 32.96, $p < .0001$ (Greenhouse-Geisser), and a significant interaction effect between age category and schooling type, F (2, 78) = 22.71, $p < .0001$ (Greenhouse-Geisser). The schooling type main effect was not significant, F (1, 39) = 0.33, $p < .5671$.

Two-correlated sample t-tests were used for follow-up multiple comparisons (cf. Maxwell, 1980) on both the age means and the age cell means at each schooling level. Results of these multiple comparisons appear in Table 2.

Insert Table 2 about here

For the age category means (cf. Tables 1 and 2), there was a significant difference between numbers of peer and younger contacts reported overall, t (39) = 4.66, $p < .0001$, as well as between numbers of older and younger

contacts, t (39) = 7.02, $p < .0001$; however, there was not a significant difference between numbers of older and peer contacts reported overall. For home schooled subjects, there was a significant difference between numbers of older and peer contacts reported, t (20) = 5.06, $p < .0001$, as well as between numbers of older and younger contacts, t (20) = 4.28, $p < .0004$; however, for public schooled subjects, there was a significant difference between numbers of older and peer contacts, t (19) = -3.96, $p < .0008$, a significant difference between numbers of older and younger contacts, t (19) = 7.15, $p < .0001$, and a significant difference between the numbers of peer and younger contacts, t (19) = 7.79, $p < .0001$.

To investigate where significant differences between home and public schooled subjects were at the different age groups, I used the Games-Howell solution for unequal n's (cf. Games & Howell, 1976; Toothaker, 1991) to compute the cell mean multiple comparisons. The mean numbers of peer contacts for home and public schooled subjects was significantly different, t (29.7) = -4.30, $p < .01$, and the mean numbers of younger contacts for home and public schooled subjects were significantly different, t (31.4) = 2.13, $p < .05$. However, the two schooling groups were not significantly different on the mean number of older contacts.

Research Question Two: Frequency of Interaction

Overall, the mode and median of frequency of interaction for Home was 4 (i.e., 1-2 times a week). For the Public sample, the mode frequency of interaction was also 4 (i.e., 1-2 times a week), but the median was 5 (3-6 times a week).

Differences between home and public schooled subjects on interaction frequency with contacts can be clearly seen in the analysis done with frequency

of interaction using a grouping of categories, as seen in Table 3, i.e., less than once per month, monthly, weekly, and daily.

Insert Table 3 about here

The repeated measures ANOVA on the above grouping indicated a significant main effect for frequency of interaction, F (3, 117) = 22.57, $p < .0001$ (Greenhouse-Geisser), and a significant interaction effect between schooling type and interaction frequency, F (3, 117) = 11.45, $p < .0001$ (Greenhouse-Geisser).

Follow-up multiple comparisons on the cell means indicated that there were significant differences between home and public schooled subjects on the following levels of frequency of interaction (using the Games-Howell procedure for unequal n's): (a) less than once a month, t (24.3) = 3.239, $p < .01$, with home schoolers reporting significantly more contacts than public schoolers; (b) monthly, t (25.0) = 2.21, $p < .05$, with home schoolers reporting significantly more contacts than public schoolers; and (c) daily, t (20.7) = -6.39, $p < .01$, with public schoolers reporting significantly more contacts than home schoolers.

Overall, these results indicate that the Public schooled subjects interacted more frequently with a greater number of contacts than the Home schooled subjects did, perhaps largely as a function of daily contacts within the public school setting. To test this idea, I eliminated from both school samples contacts for whom subjects listed the SCHOOL as a place of interaction. Out of 1,125 total contacts, the public sample reported only 466 contacts (41.4%) that they did NOT interact with at school, while the home sample

reported 947 out of 1,035 (91.5%) contacts that they did not interact with at school. With this elimination, the public sample still reported a greater mean number of DAILY contacts (M = 4.05) than the home sample did (M = 2.81); however the home sample reported a greater number of WEEKLY contacts (M = 21.48) than the public sample did (M = 14.50). But follow-up multiple comparisons on the cell means (Games & Howell, 1976) indicated that neither of these differences between schooling groups were significant at $p < .05$.

Research Question Three: Relationship Types

Are there significant differences between home and public schooled subjects for use of the different relationship types, in terms of the mean proportion of contacts per subject for each relationship type? T-tests on each of the nine given response options indicated a significant difference between Home and Public subjects on the relationship types of (a) family member, t (32.4) = 2.22, $p < .0335$, (b) friend, t (31.6) = -3.66, $p < .0009$, and (c) classmate, t (24.9) = -7.50, $p < .0001$. Public subjects had a significantly greater percentage of contacts labeled as "friend" and "classmate," while Home subjects had a greater number of contacts labeled as "family member."

Are there significant differences (or interaction effects with schooling type) between the parental and peer friend relationships on mean scores reported by subjects for contacts on closeness items and/or supportiveness items?

Closeness. For the overall closeness mean, as seen in Table 4, there was a significant main effect for relationship type ("reltype"), F (1, 39) = 134.47, $p < .0001$, with greater closeness reported for parents (M = 2.77) than for peer friends (M = 2.02). The Home sample differed significantly between parents (M = 2.76) and peer friends (M = 1.96) on the overall closeness mean, t

(20) = 10.28, $p < .0001$; the Public sample also differed significantly on the overall closeness mean between parents ($M = 2.79$) and peer friends ($M = 2.09$), t (19) = 6.70, $p < .0001$ (two-correlated sample t-tests).

Insert Table 4 about here

Supportiveness. For the overall supportiveness mean, all main and interaction effects were significant, i.e., (a) the school main effect, F (1, 39) = 4.91, $p < .0327$, with greater scores given by Public subjects than by Home subjects, (b) the reltype main effect, F (1, 39) = 156.29, $p < .0001$, with greater scores for parents ($M = 4.21$) than for peer friends ($M = 2.65$), and (c) the school by reltype interaction effect, F (1, 39) = 4.70, $p < .0363$. For the peer friend relationship, there was a significant difference between Home ($M = 2.31$) and Public ($M = 3.00$) subjects on the overall supportiveness mean, t (37.3) = -2.50, $p < .05$ (Games-Howell solution for unequal n's). Further, the Home sample differed significantly between parents ($M = 4.14$) and peer friends ($M = 2.31$) on the overall mean, t (20) = 9.94, $p < .0001$; also, the Public sample differed significantly between parents ($M = 4.30$) and peer friends ($M = 3.00$), t (19) = 7.70, $p < .0001$ (two-correlated sample t-tests).

As seen in Table 5, all of the individual items had at least one effect that was significant, except for the item "s/he lets me off lightly when I do something wrong."

Insert Table 5 about here

Discussion

The most interesting finding from the first research question was in how different the home and public schoolers are in terms of the ages of their contacts. One hypothesis that has been forwarded by home schooling proponents and opponents alike is that home schoolers have less opportunity to interact with peers than public schoolers do. This hypothesis was indeed supported by this study. The public schoolers had significantly more peer (within 2 years of subject's age) contacts than the home schoolers; however, the home schoolers had significantly more younger (2+ years younger than subject) contacts than public schoolers. Overall, the home schoolers had significantly more older contacts than either peer or younger contacts; however, the public schoolers had significantly more peer contacts than older or younger contacts, as well as significantly more older than younger contacts. The finding that home schoolers have more older contacts than peer contacts is not surprising, since they do not have the traditional schooling place to provide them with potential peer contacts. Neither is the finding surprising that public schoolers have more peer contacts than the home schoolers, as the public schoolers spend so much more time at a conventional school, with numerous potential peer contacts.

These results for public schoolers are consistent with studies by Bo (1990) and Montemayor and Van Komen (1980), who found that adolescents interacted with more peers than adults or children; however, the results for the home schoolers contradicted these findings, as the home schoolers reported more older than peer contacts, demonstrating that home schoolers do have more mixed-age than same-age interaction and socialization opportunities (Hartup, 1978) and have less opportunities to become "peer-dependent" than the public schooler, although this phenomenon is still not out of the realm of possibility

for the home schooler since s/he does interact some with peers. The issue of whether or not the home vs. public schooler is actually more peer-dependent or parent-dependent is not covered by this question. To begin answering that question, more information needs to be gathered regarding who the home vs. public schooler actually turns to in various situations.

One thing to keep in mind regarding the first research question and the answers found is that the public schoolers' networks were measured at the end of their school year in May. Were all of the contacts identified with whom the public schoolers normally interact during the school year? Further, was this month (month of April, for home schoolers) adequate as a sampling period? Perhaps there are seasonal variations in size and diversity of social networks for both home and public schoolers. What differences are there between the networks of public schoolers and home schoolers, for example, in the summer months? Although both groups had the opportunity to add to their list after the month's journaling was complete, how many of the subjects did this was not clear.

The second research question found significant differences between levels of interaction frequency with all the contacts. Overall, the public schoolers interacted with more contacts more often. Specifically, the public schoolers talked to more contacts on a daily basis than the home schoolers, while the home schoolers reported talking to more contacts less than once a month and on a monthly basis than the public schoolers did. Home schoolers reported talking to more of their contacts weekly than they did daily, monthly, or less than once a month, while the public schoolers reported talking to their contacts weekly and daily at approximately the same level, both of which were greater than monthly or less than once a month. The number of daily contacts for the

public schoolers was due, in part, to their school contacts, for when the two groups were analyzed without their respective school place contacts included, there were no significant differences between home and public schoolers on the number of daily contacts, and the home schoolers reported a greater (although not significant) number of weekly contacts than the public schoolers. Only 41.4% of the public schoolers' contacts are not interacted with at school. These results demonstrate that the schooling process does indeed make a difference in how often an adolescent interacts with his/her contacts.

However, the way this study measured interaction frequency is problematic in that it does not clearly answer the question of how much interaction is taking place within a relationship, nor does it consider the quality of the interaction that is taking place. The subjects were simply asked to identify how often they interacted for at least two minutes or more with each particular person. There is a qualitative difference between a 2 minute and a 30 minute interaction, yet potentially a subject could interact with a contact for only 10 minutes a day, at five different times, and report that s/he talks to that contact for "5+ times per day." For another contact, however, the subject could indicate only "1 time per day," and talk to that person for a total of 30 minutes. Therefore, the levels of the interaction frequency variable, even though they increase, do not adequately indicate an increase in total amount of time spent with a person. More "hard" data needs to be collected on the actual time spent within various relationships.

On the third research question, regarding relationship types interacted with by the two groups, the home schoolers reported interacting with more family members than the public schoolers did, while the public schoolers interacted with more friends and classmates than the home schoolers. As

expected, the home schoolers do interact with more family members than home schoolers, perhaps in part due to there being more siblings present overall in the home schooling families, but perhaps also because the home schoolers have more time to interact with family than the public schoolers do, although this latter hypothesis was not tested by this study. This particular sub-question illustrates how the particular month sampled during the data collection could play a large part in what roles are chosen, e.g., extended family member (if only visited during the summer by public schoolers AND at other times by home schoolers). Perhaps, for example, "vacations" to visit extended family are scheduled at different times during the school year by home schoolers, and not primarily in the summer months as one might expect for public schoolers. However, whether or not this phenomenon specifically affected this study is not clear.

In the analysis comparing the relationships of parent and peer friends for the home and public schoolers, the results on closeness and supportiveness overwhelmingly revealed the importance of the parental relationship for both schooling groups. All of the significant differences between parental and peer friend contacts on closeness and supportiveness revealed that parents were ranked higher than peer friends. These results are similar to what Hertz-Lazarowitz et al. (1989) and Bo (1990) found, in that parents were rated higher by adolescents on intimacy than peers were. But these results are different than those of Kon and Losenkov (1978), who found that closest friends were ranked highest on items similar to the ones used in this study for closeness; however, this study did not just limit the response for peer friends to "closest friend," as they did. Using this distinction in further studies might reveal different results.

I was surprised that both home AND public schoolers scored parents more highly than peer friends overall on closeness and supportiveness and on specific items. Would these findings hold for all ages, especially as the child gets older? This was not tested. The two closeness items that were significantly different for both home and public schoolers were "how much do you go to this person for advice," and "how much does this person accept you no matter what you do." Perhaps "advice" was interpreted in the first item as involving issues in which parents' historical experience and wisdom would be valued as more important than peers' contemporary experience (cf. Rawlins & Holl, 1988). This could be tested by asking in future studies the question "how much do you go to this person for advice on _____," listing several different potential areas of concern. Also, this finding is consistent with Rawlins and Holl's (1988) second dialectical principle which proposed that adolescents use "the dialectic of judgment and acceptance" to make decisions about whom to talk to about what. In this principle, parents are seen as being more concerned than peers with the adolescent's best interests and therefore more willing to give advice with those interests in mind. Further, Rawlins and Holl (1988) note that peers are more likely to accept an adolescent as s/he is, without resorting to judging or giving advice. The finding on the second significant closeness item seems inconsistent with this, until one considers that the peer friend environment does not necessarily have to be one of unconditional acceptance and love but rather can be one of competitiveness. However, how much this is true for the peer FRIEND relationship is not known. Further, just because peer friends were scored significantly lower than parents on the item does not mean that subjects rated peer friends as not accepting them at all. Also, we do not know what the phrase "accept you no matter what

you do" meant for the subjects (e.g., total lack of rejection, unconditional acceptance).

Public schoolers scored significantly higher on the advice item for peer friends than home schoolers did. Perhaps attending public school does affect the amount of peer dependency, in regards to asking for advice, that an adolescent has. However, this "peer dependency" is still not outweighing the role of the parents' point of view for the public schoolers. Rather, both relationships are seen as important, whereas for the home schoolers, the parent relationship is the key. Note also that home schoolers (as opposed to public schoolers, for which there was no significant difference) scored parents more highly than peer friends on the closeness item, "how much do you share your inner feelings with this person," indicating once again that parents serve a more key role in the home schoolers' lives, as a single-process model of support would say. On the other hand, while the public schoolers and home schoolers rated parents approximately equally, the public schoolers did not differ significantly between parents and peer friends on this item, indicating that both relationships are important ones for them in terms of sharing inner feelings, a finding that supports a dual-process model of support. This finding is also supported by the multiple comparisons comparing home vs. public schoolers on the peer friend relationship, as discussed below.

There were differences between the home and public schoolers for the peer friend relationship on the following closeness and supportiveness items, with the public schoolers scoring significantly higher across these items: (a) "how much do you go to this person for advice," (b) overall supportiveness, (c) "s/he comforts and helps me when I have troubles," (d) "s/he teaches me things I want to learn," (e) "s/he encourages me to try new things on my own," and (f)

"s/he lets me make my own plans about things I want to do, even though I might make a few mistakes." In short, peer friendships provided more instrumental and informational support (cf. Tietjen, 1989), i.e., the presence of helping in a relationship and the availability of advice/guidance, for the public schoolers than for the home schoolers. Here again, the effects of the process of schooling on relationships is clearly seen, this time within the peer friend relationship.

The evidence from research question three indicates that "peer dependency" for public schoolers, contrary to the thinking of some home schooling advocates, is not an "either-or" phenomenon. It is not either "parents" or peers," but rather these relationships interact (with other relationships) to help create the dynamics of the social network of the public schooler. It is true, however, in regards to perceived closeness and supportiveness of peer friends, that the home schoolers do not rely on the peer friend relationship as much as the public schoolers do. Of course, this may be due to more amount of time available for public schoolers to spend with peer friends within the conventional school place. However, this study did not investigate how many of the public schoolers' peer friends interacted with them at school, nor did it investigate any possible interaction between frequency of interaction and perceived closeness/support in a relationship.

The data found in this research question do indeed support a single-process vs. dual-process model of social support for home vs. public schoolers respectively, in that parents were found to be important for both schooling groups, but peer friends played more of a role for the public schoolers than for the home schoolers in closeness and supportiveness.

Overall, however, one must keep in mind that these results do not "tap into" the process of communication taking place within these relationships, but only provide a static view of these relationships. More studies need to be done with actual data on communication behavior across different relationships to test the single- vs. dual-process (or multi-process, with other relationship types) models of support between home and public schoolers. Further, more information is needed about specific family subsystems; for example, do home and public schooled children differ in their relationships to mother vs. father, sister vs. brother, and/or sibling vs. peer friend.

Other questions that need to be investigated include (a) how does a home schooler's (vs. a public schooler's) relationships change over time, longitudinally, (b) what happens to the social networks when home schooled children are placed into a traditional school or when public schoolers are taken out of conventional school to be home schooled, (c) are home schoolers more skilled in mixed-age interactions than in same-age interactions (cf. Hartup, 1978), (d) how do home schoolers compare to public schoolers in both familial and non-familial mixed-age vs. same-age interactions, and (e) are different types of interactions present for home and public schoolers in their close vs. non-close relationships?

In conclusion, this study is seen as a preliminary step to studying the actual communication behaviors and social skills of home vs. public schooled children. This study demonstrates that the home schooling process does indeed affect the nature of the relationships experienced in adolescence for home schoolers. In answering the question, "what are the differences between the home and public schooled children's social networks," this study found overall that home schoolers are not "at risk" (as compared to a similar group of public

schoolers) in terms of the total numbers of people with whom to interact, although this varies from family to family (e.g., home schooled girl who reported only seven total contacts). But home schoolers are "at risk" in the sense of feeling less closeness towards and receiving less support from their peer friend relationships than the similar group of public schoolers reported they did in this study.

References

Adler, T. F., & Furman, W. (1988). A model for children's relationships and relationship dysfunctions. In S. W. Duck (Ed.), Handbook of personal relationships (pp. 211-229). New York: John Wiley & Sons.

Allie-Carson, J. (1990). Structure and interaction patterns of home school families. Home School Researcher, 6 (3), 11-18.

Armsden, G. C., & Greenberg, M. T. (1987). The inventory of parent and peer attachment: Individual differences and their relationship to psychological well-being in adolescence. Journal of Youth and Adolescence, 16 (5), 427-454.

Asher, S. R., & Williams, G. A. (1987). Helping children without friends in homes and school contexts. In S. R. Asher, G. A. Williams, C. B. Burton, & S. Oden (Eds.), Children's social development: Information for teachers and parents (pp. 1-26). Washington, D.C.: Office of Educational Research and Improvement. (ERIC Document Reproduction Service No. ED 283625)

Bliss, B. A. (1989). Home education: A look at current practices. East Lansing, MI: Michigan State University. (ERIC Document Reproduction Service No. ED 304 233)

Blyth, D. A. (1984). The intimate worlds of early adolescents: Using social mapping techniques for exploration and prediction. Symposium presented at the biennial meeting of the Midwestern Society for Research in Life-Span Development, Akron, OH.

Blyth, D. A., Hill, J. P., & Thiel, K. S. (1982). Early adolescents' significant others: Grade and gender differences in perceived relationships with familial and non-familial adults and young people. Journal of Youth and Adolescence, 11 (6), 425-450.

Blyth, D. A., & Traeger, C. (1988). Adolescent self-esteem and perceived relationships with parents and peers. In S. Salzinger, J. Antrobus, & M. Hammer (Eds.), Social networks of children, adolescents, and college students (pp. 171-194). Hillsdale, NJ: Lawrence Erlbaum Associates.

Bo, I. (1990). The significant people in the social networks of adolescents. In K. Hurrelmann & U. Engel (Eds.), The social world of adolescents: International perspectives (pp. 141-165). New York: Walter de Gruyter & Co.

Cauce, A. M. (1986). Social networks and social competence: Exploring the effects of early adolescent friendships. American Journal of Community Psychology, 14, 607-628.

Cochran, M., & Bo, I. (1989). The social networks, family involvement, and pro- and antisocial behavior of adolescent males in Norway. Journal of Youth and Adolescence, 18 (4), 377-398.

Cochran, M. M., & Brassard, J. A. (1979). Child development and personal social networks. Child Development, 50, 601-616.

Crockett, L., Losoff, M., & Petersen, A. C. (1984). Perceptions of the peer group and friendship in early adolescence. Journal of Early Adolescence, 4 (2), 155-181.

Csikszentmihalyi, M., Larson, R., & Prescott, S. (1977). The ecology of adolescent activity and experience. Journal of Youth and Adolescence, 6 (3), 281-294.

Devereux, E. C., Jr., Bronfenbrenner, U., & Rodgers, R. R. (1969). Childrearing in England and in the United States. Journal of Marriage and the Family, 31, 257-270.

Devereux, E. C., Jr., Bronfenbrenner, U., & Suci, G. J. (1962). Patterns of parent behaviour in the United States of America and the Federal Republic of Germany: A cross-national comparison. International Social Science Journal, 14, 488-506.

Furman, W., & Buhrmester, D. (1985). Children's perceptions of the personal relationships in their social networks. Developmental Psychology, 21, 1016-1024.

Games, P. A., & Howell, J. F. (1976). Pairwise multiple comparison procedures with unequal n's and/or variances. Journal of Educational Statistics, 1, 113-125.

Garvey, C. (1986). Peer relations and the growth of communication. In E. Mueller & C. Cooper (Eds.), Process and outcome in peer relationships (pp. 329-345). New York: Academic Press.

Gottman, J., Gonso, J., & Schuler, P. (1976). Teaching social skills to isolated children. Journal of Abnormal Child Psychology, 4, 179-197.

Greenberg, M. T., Siegel, J. M., & Leitch, C. J. (1983). The nature and importance of attachment relationships to parents and peers during adolescence. Journal of Youth and Adolescence, 12, 373-386.

Greene, S. S. (1984). Home study in Alaska: A profile of K-12 students in the Alaska Centralized Correspondence Study program. (ERIC Document Reproduction Service No. ED 255 494)

Hartup, W. W. (1978). Children and their friends. In H. McGurk (Ed.), Issues in childhood social development (pp. 130-170). London: Metheun.

Hartup, W. W. (1979). The social worlds of childhood. American Psychologist, 34, 944-950.

Hatch, J. A. (1987). Peer interaction and the development of social competence. Child Study Journal, 17 (3), 169-183.

Hertz-Lazarowitz, R. L., Rosenberg, M., & Guttmann, J. (1989). Children of divorce and their intimate relationships with parents and peers. Youth and Society, 21 (1), 85-104.

Hunter, F. T. (1984). Socializing procedures in parent-child and friendship relations during adolescence. Developmental Psychology, 20 (6), 1092-1099.

Hunter, F. T. (1985). Adolescents' perception of discussions with parents and friends. Developmental Psychology, 21 (3), 433-440.

Hunter, F. T., & Youniss, J. (1982). Changes in functions of three relations during adolescence. Developmental Psychology, 18, 806-811.

Kon, I. S., & Losenkov, V. A. (1978). Friendship in adolescence: Values and behavior. Journal of Marriage and the Family, 40, 143-155.

Larson, R. W. (1983). Adolescents' daily experience with family and friends: Contrasting opportunity systems. Journal of Marriage and the Family, 45 (4), 739-750.

Larson, R., Kubey, R., & Colletti, J. (1989). Changing channels: Early adolescent media choices and shifting investments in family and friends. Journal of Youth and Adolescence, 18 (6), 583-599.

Maarse-Delahooke, M. (1986). Home educated children's social/emotional adjustment and academic achievement: A comparative study (Doctoral dissertation, California School of Professional Psychology, Los Angeles, 1986). Dissertation Abstracts International, 47, 475A.

Maccoby, E. E., & Martin, J. A. (1983). Socialization in the context of the family: Parent-child interaction. In E. M. Hetherington (Ed.), Handbook of

child psychology, Vol. 4: Socialization, personality, and social development (pp. 1-101). New York: Wiley.

Maxwell, S. E. (1980). Pairwise multiple comparisons in repeated measures designs. Journal of Educational Statistics, 5, 269-287.

Montemayor, R. (1982, August). Arguments with parents and parent-peer involvement during adolescence. Paper presented at the annual meeting of the American Psychological Association, Washington, D.C.

Montemayor, R., & Van Komen, R. (1980). Age segregation of adolescents in and out of school. Journal of Youth and Adolescence, 9 (5), 371-381.

Montgomery, L. (1988, October). Home schooled kids: Leaders or losers. In L. Montgomery (Chair), Home schooled kids: Leaders or losers. Symposium conducted at the Seattle University Public Seminar Series in Educational Leadership, Seattle, Washington.

Moore, R. S. (1987, June). What educators should know about home schools. Paper presented to the United States Department of Education Conference on Home Schooling, Washington, D. C.

Olson, G., Sprenkle, D., & Russell, C. (1979). Circumplex model of marital and family systems: I. Family Process, 18, 3-28.

Piaget, J. (1926). The language and thought of the child. New York: Harcourt, Brace.

Piaget, J. (1932). The moral judgment of the child. Glencoe, IL: Free Press.

Rawlins, W. K., & Holl, M. (1988). Adolescents' interaction with parents and friends: Dialectics of temporal perspective and evaluation. Journal of Social and Personal Relationships, 5, 27-46.

Reed, K. (1984). A home educator reflects on socialization myth. In S. Welch (Ed.), Socialization (pp. 7 & 12). Portland, OR: Christian Home Schools.

Romaine, S. (1984). The language of children and adolescents: The acquisition of communicative competence. New York: Basil Blackwell.

Rubin, Z. (1982). Children without friends. In L. A. Peplau & D. Perlman (Eds.), Loneliness: A sourcebook of current theory, research, and therapy (pp. 255-268). New York: Wiley-Interscience.

Salzinger, S., Hammer, M., & Antrobus, J. (1988). From crib to college: An overview of studies of the social networks of children, adolescents, and college students. In S. Salzinger, J. Antrobus, & M. Hammer (Eds.), Social networks of children, adolescents, and college students (pp. 1-16). Hillsdale, NJ: Lawrence Erlbaum Associates.

Schemmer, B. A. S. (1985). Case studies of four families engaged in home education (Doctoral dissertation, Ball State University, 1985). Dissertation Abstracts International, 46, 2560-2651A.

Sebald, H. (1986). Adolescents' shifting orientation toward parents and peers: A curvilinear trend over recent decades. Journal of Marriage and the Family, 48 (1), 5-13.

Smollar, J., & Youniss, J. (1982). Social development through friendship. In K. H. Rubin & H. S. Ross (Eds.), Peer relationships and social skills in childhood (pp. 279-298). New York: Springer-Verlag.

Stohl, C. (1989). Children's social networks and the development of communicative competence. In J. Nussbaum (Ed.), Life-span communication: Normative processes (pp. 53-77). Hillsdale, NJ: Lawrence Erlbaum Associates, Publishers.

Sullivan, H. S. (1953). The interpersonal theory of psychiatry. New York: Norton.

Taylor, J. W. (1987). Self-concept in home schooling children (Doctoral dissertation, Andrews University, 1986). Dissertation Abstracts International, 47, 2809A.

Tietjen, A. M. (1982). The social networks of preadolescent children in Sweden. International Journal of Behavioral Development, 5, 111-130.

Tietjen, A. M. (1989). The ecology of children's social support networks. In D. Belle (Ed.), Children's social network and social supports (pp. 37-69). New York: John Wiley & Sons.

Toothaker, L. E. (1991). Multiple comparisons for researchers. Newbury Park, CA: SAGE Publications, Inc.

Vondra, J., & Garbarino, J. (1988). Social influences on adolescent behavior problems. In S. Salzinger, J. Antrobus, & M. Hammer (Eds.), Social networks of children, adolescents, and college students (pp. 195-224). Hillsdale, NJ: Lawrence Erlbaum Associates.

Walker, L. S., & Greene, J. W. (1986). The social context of adolescent self-esteem. Journal of Youth and Adolescence, 15 (4), 315-322.

Wartes, J. (1987). Report from the 1986 homeschool testing and other descriptive information about Washington's homeschoolers: A summary. Home School Researcher, 3 (1), 1-4.

Welch, S. (1984). Socialization experience shared through survey. In S. Welch (Ed.), Socialization (pp. 10-11). Portland, OR: Christian Home Schools.

Appendix

1. Name of contact _____

   A. Sex - male or female (circle one)

   B. Race

   C. Educational level (grade and type of school--public, private, home):

   D. Age:

   E. Place(s) of interaction
      1. school
      2. church
      3. your home
      4. other person's home
      5. phone
      6. other (please specify)

   F. Length of acquaintance
      1. 0 - 6 months
      2. 6 - 12 months
      3. 1 - 3 years
      4. 3 - 6 years
      5. 6+ years

   G. How did you get to know this person? How did you first meet him/her?

   H. Frequency of interaction (at least two minutes or more)
      1. less than once per month
      2. 1 time per month
      3. 2 - 3 times/month
      4. 1 - 2 times/week
      5. 3 - 6 times/week
      6. 1 time per day
      7. 2 - 4 times per day
      8. 5+ times per day

   I. What activities do you commonly do together (for example: sing in choir, play sports, go out to eat, do schoolwork, go on fieldtrips, study Bible)?

   J. What kinds of things do you commonly talk to this person about (for example: baseball games, music, problems, hobbies, school, Bible)? (See lists of daily interactions & topics.)

K. Relationship Type(s)
1. Family member
2. Friend
3. Teacher/coach
4. Sports team member
5. Band/choir member
6. Classmate
7. Neighbor
8. Fellow worker
9. Acquaintance
10. Other (please specify)

For questions L - O, please choose one of the following three answers, writing down the number of the answer you choose in the space provided underneath each question.

1. not at all 2. some 3. a lot

L. How much do you go to this person for advice?

M. How much do you share your inner feelings with this person?

N. How much does this person accept you no matter what you do?

O. How much does this person understand what you're really like?

For questions P - Y, please choose one of the following five answers, writing down the number of the answer you choose in the space provided underneath each question.

1. never 2. only once in a while 3. sometimes
4. usually 5. almost always

P. S/he comforts and helps me when I have troubles.

Q. S/he makes me feel I can talk with him/her about everything.

R. S/he makes me feel s/he is there if I need him/her.

S. When s/he wants me to do something, s/he explains why.

T. S/he helps me with homework or lessons, if there is something I don't understand.

U. S/he teaches me things I want to learn.

V. I know what s/he expects of me and how s/he wants me to behave.

W. S/he encourages me to try new things on my own.

X. S/he lets me make my own plans about things I want to do, even though I might make a few mistakes.

Y. S/he lets me off lightly when I do something wrong.

Table 1

Contact Ages in Relation to Subject Ages: Frequencies, Percentages, and Mean Number of Contacts Per Subject

Contact age	Frequency	Percent	Mean
Younger than subject			
Home	212	20.5%	10.1
Public	106	9.4%	5.3
TOTAL mean			7.8
Peer of subject			
Home	232	22.4%	11.0
Public	592	52.6%	29.6
TOTAL mean			20.1
Older than subject			
Home	588	56.8%	28.0
Public	409	36.4%	20.5
TOTAL mean			24.3
Not reported			
Home	3	0.3%	
Public	18	1.6%	

Note. Percentages are computed by schooling type.

Table 2

Older, Peer, and Younger Contacts: Multiple Comparisons

Age Comparison	Mean Difference	df	*t*	*p*
Older - Peer				
Total	4.22	39	1.46	.1524
Home	16.95	20	5.06	.0001*
Public	-9.15	19	-3.96	.0008*
Older - Younger				
Total	16.56	39	7.02	.0001*
Home	17.90	20	4.28	.0004*
Public	15.15	19	7.15	.0001*
Peer - Younger				
Total	12.34	39	4.66	.0001*
Home	0.95	20	0.42	.6825
Public	24.30	19	7.79	.0001*

Note. Using Dunn, significance levels at alpha = .01 were computed by dividing alpha by the number of comparisons done. For the comparisons on the main effect means ("total"), this was .01/3 = .0033. For the cell means for "home" and "public," this was .01/6 = .0016.

*$p < .01$.

Table 3

Frequency of Interaction Grouped Categories: Frequencies, Percentages, and Mean Number of Contacts Per Subject at Different Levels

Frequency of Interaction	Frequency	Percent	Mean
Less than once per month			
Home	162	15.7%	7.7
Public	31	2.8%	1.6
TOTAL mean			4.7
Monthly (categories #2-3)			
Home	289	27.9%	13.8
Public	98	8.7%	4.9
TOTAL mean			9.4
Weekly (categories #4-5)			
Home	470	45.4%	22.4
Public	531	47.2%	26.6
TOTAL mean			24.4
Daily (categories #6-8)			
Home	114	11.0%	5.4
Public	465	41.3%	23.3
TOTAL mean			14.1

Note. Percentages are computed by school type.

Table 4

Parent vs. Peer Friend: Analysis of Variance Results on Closeness Items

Item	df	F value	p value
Go to for advice			
School	1,39	3.43	.0715
Reltype (parent/friend)	1,39	281.30	.0001**
School * Reltype	1,39	7.33	.0100**
Share inner feelings			
School	1,39	1.00	.3233
Reltype (parent/friend)	1,39	68.72	.0001**
School * Reltype	1,39	0.00	.9913
Accepts you			
School	1,39	0.07	.7880
Reltype (parent/friend)	1,39	44.42	.0001**
School * Reltype	1,39	0.08	.7851
Understands you			
School	1,39	0.10	.7482
Reltype (parent/friend)	1,39	45.78	.0001**
School * Reltype	1,39	0.14	.7097
Overall closeness mean			
School	1,39	0.94	.3374
Reltype (parent/friend)	1,39	134.47	.0001**
School * Reltype	1,39	0.59	.4455

Note. Scale values: (0) not applicable; (1) not at all; (2) some; (3) a lot.
*$p < .05$. **$p < .01$.

Table 5

Parent vs. Peer Friend: Analysis of Variance Results on Supportiveness Items

Item	df	F value	p value
Comforts/helps			
School	1,39	3.60	.0652
Reltype (parent/friend)	1,39	167.54	.0001**
School * Reltype	1,39	4.47	.0409*
Can talk with			
School	1,39	0.79	.3790
Reltype (parent/friend)	1,39	109.25	.0001**
School * Reltype	1,39	1.67	.2044
Is there in need			
School	1,39	0.73	.3970
Reltype (parent/friend)	1,39	128.50	.0001**
School * Reltype	1,39	1.13	.2951
Explains when wants			
School	1,39	0.71	.4042
Reltype (parent/friend)	1,39	31.44	.0001**
School * Reltype	1,39	0.81	.3746
Helps with homework			
School	1,39	3.48	.0696
Reltype (parent/friend)	1,39	127.73	.0001**
School * Reltype	1,39	16.85	.0002**
Teaches things			
School	1,39	1.68	.2029
Reltype (parent/friend)	1,39	139.18	.0001**
School * Reltype	1,39	4.72	.0360*
Know expectations			
School	1,39	0.68	.4139
Reltype (parent/friend)	1,39	73.79	.0001**
School * Reltype	1,39	0.00	.9556
Encourages new things			
School	1,39	4.55	.0393*
Reltype (parent/friend)	1,39	86.17	.0001**
School * Reltype	1,39	1.88	.1784
Lets make own plans			
School	1,39	13.58	.0007**
Reltype (parent/friend)	1,39	12.53	.0011**
School * Reltype	1,39	2.15	.1506
Lets off lightly			
School	1,39	3.52	.0681
Reltype (parent/friend)	1,39	0.69	.4122
School * Reltype	1,39	0.24	.6302

(table continues)

Item	df	*F* value	*p* value
Overall supportiveness mean			
School	1,39	4.91	.0327*
Reltype (parent/friend)	1,39	156.29	.0001**
School * Reltype	1,39	4.70	.0363*

Note. Scale values: (0) not applicable; (1) never; (2) only once in a while; (3) sometimes; (4) usually; (5) almost always.

*$p < .05$. **$p < .01$.